

Encyclopedia of
Manufacturer's Marks
on Glass Containers
W-X-Y-Z

Compiled and Edited by
The Bottle Research Group

© Bill Lockhart 2020

Although we have placed a copyright on this material, Bill Lockhart and the Bottle Research Group grant everyone the right to use our research. We only request that you cite us and this volume in any reuse of the material.

Preface to the Encyclopedia of Manufacturer's Marks on Glass Containers W-X-Y-Z

The purpose of this encyclopedia is to update the venerable (and outdated) classic *Bottle Makers and Their Marks*, published by Julian Harrison Toulouse in 1971. Toulouse did a fantastic job, using the available technology of the 1960s. Much of his information came in the form of letters – now frequently referred to as snail-mail – generally handwritten and filled with semi-accurate or inaccurate information. It is remarkable how well he was able to create his 625-page study. However, that study is 48 years old in 2019. It is time for an update.

Background

The Bottle Research Group (BRG) is a consortium of archaeologists and other interested researchers dedicated to the study of glass containers. Our origins date to some point in 2002, when Bill Lindsey e-mailed Bill Lockhart, wanting to share information about bottles. The two rapidly became friends. Carol Serr first contacted Lockhart on August 8, 2003, because one of Lockhart's e-books contained the only example of a Clysmic bottle Serr could find online. On March 4, 2004, the three began group discussions about bottles.

Although the focus of the three researchers was very general, Lockhart, conducting research on soda bottles in El Paso, Texas, had become concerned because there was no information on the T-in-a-keystone logo that he was finding on El Paso bottles. Toulouse was silent on the subject, and none of the other publications about bottle markings offered any information. After considerable searching, Lockhart published an article on the Keystone-T logo and other marks used by the Knox Glass Bottle Co. After reading the article, David Whitten – a collector, researcher, and owner of a website about glass manufacturer's marks – joined the BRG on March 19, 2004. Whitten withdrew from the group in August 2005 to deal with other interests, although he has remained a contributor, and his manufacturer's mark website continues to be one of the best quick-reference sites on the subject.

After discussing bottles with Carol Serr for some time, Pete Schulz joined the BRG on October 21, 2005. By this time, the BRG was having regular annual field trips and had concentrated on the study of manufacturer's marks. The researchers officially adopted the title of the Bottle Research Group in 2006. In March 2010, Schulz suffered a disabling stroke and had to become inactive in the group. As of 2019, Schulz remains inactive, and his presence is still sorely missed.

On July 28, 2010, Beau Schriever e-mailed Lockhart to discuss Clorox bottles. Schriever hosted Lockhart (and his wife, Wanda Wakkinen) for a tour of a Fort Bayard, New Mexico, trash dump from November 23-25, 2010. On January 22, 2011, Schriever became a member of the BRG. Nate Briggs found us online and wanted to discuss some bottles he had found. The discussions became more intense and complex until Nate became a member on January 26, 2017 – although Nate withdrew from the group in May. Bob Brown, a periodic contributor to the BRG efforts joined the group in June 2019. The five members continue to comprise the core group of the BRG.

The actual picture, however, is *much* larger. The BRG has developed a huge network of contributors, who may only supply information about a single bottle, jar or factory – or who may regularly or sporadically contribute information. Throughout this encyclopedia, we have recognized most of these outstanding helpers as coauthors or contributors by citing specific contributions and/or by thanking them in the “Acknowledgments” areas of each chapter. We can attribute the quality and quantity of our information to this group of well over 200 archaeologists, collectors, historians, and just plain folks who find bottles (probably twice that number by 2018) – who share their knowledge and expertise with us.

Earlier, we mentioned the limitations that Toulouse worked under as he amassed his data during the 1960s. Because Toulouse worked in the glass industry (Owens-Illinois Glass Co.), he had access to many of the trade journals and a working knowledge of the players in the glass game at the time. In addition, he belonged to the glass collector's network begun by May Jones (first in California, then in Nara Visa, New Mexico). Through Jones, Toulouse received input via letters from collectors all over the U.S.

We have a tremendously expanded network and access to sources. Internet searches open vast vistas that were unknown 40 years ago, especially into the realm of scanned books and articles, archaeological networks, online newspaper databases, and collectors' websites. One of the amazing things about the internet is that new venues appear almost daily. In addition, through the medium of e-mail and listserves, we are in contact with literally hundreds of archaeologists, collectors, historians, historical societies, museums, and just interested people. We can scan photos and drawings and capture photos from featured websites, eBay, and other online auctions. We are also in touch with professionals in today's glass industry and numerous authors and researchers. In short, we have hundreds of resources that were unavailable in the days of Toulouse.

How to Use this Encyclopedia

The Encyclopedia is divided into letter sections (A, B, C, etc.) with some combinations (e.g., the T-U-V section). Each of these letter sections contains a series of titles, usually the name of a glass manufacturer or a family name (e.g., the Thatcher Mfg. Co. or the Travis Glass Co.). Occasionally, the title will reflect a logo that was used by more than one glass house (e.g., The Letter S used by several glass houses). Titles were also selected according the way the *glass firm* styled itself. For example, T.C. Wheaton will be found in the "T" section – rather than the "W" section. Some firms, however, just did not work that way, so we have some oddities like the Star Jars, attempting to unravel the twisted skein of jars embossed with stars.

There is *no* classification system that will work perfectly for assigning positions for either glass factories or manufacturer's marks. To help our readers locate information, we have provided two tables (each in its own file or chapter – depending on whether you are using the printed or online format). The first table is a list of all factories found within a specific letter section. For example, the factory lists in the "W-X-Y-Z" section include intuitively obvious plants, such as the Whitall Tatum Glass Co. or the Whitney companies. However, it also includes derivative factories, such as the A.V. Whiteman or the North Wheeling Glass Co. – many of them counterintuitive. Each listing will direct the reader to the individual chapter where a discussion of the glass plant is found (e.g., the Frank Glass Co. is discussed in the Other W chapter). A second table will direct the reader to specific chapters that discuss individual maker's marks. For example, the "W.G.M.Co." logo will be discussed in the Western Glass Mfg. Co. chapter, and the T.W.G monogram will appear in the Wightman Glass Firms section.

Other Important Information

Information locked into glass containers is *not* limited to manufacturer's marks, of course. The glass house logos are always related to the type of container, sometimes the color, the manufacturing techniques involved, and other codes. We have tried to address all of these variables in our discussions of marks.

The logos themselves are also much more complex than Toulouse (and most other researchers) indicated. For example, various shapes can tell us things about both time and company. In most 19th century beer bottles, for example, the “o” in “Co” can be regular or superscript, usually with an underline (e.g., WGC_o or WGC^o). The superscript is consistently earlier in bottles made by most glass houses of the period. Marks used by the Wisconsin Glass Co. were made in several formats, each with its temporal association; it is important to know what shape was used as well as the W.G.Co initials. A Circle-A logo on a bottle that was mouth-blown into a mold was used by the Richmond plant of the American Glass Co. before 1920, while the same mark on a machine-made bottle was used by the Armstrong Cork Co. from 1938 to 1969.

The other codes on the bottles may often be useful. Although mold codes on 19th century beer bottles and some other styles can give us a sense of a bottle's age, they become increasingly less helpful as we move into the machine era. Some companies with multiple factories also used factory codes. Where applicable, we have discussed these. Some numbers are catalog or model codes (usually called mold codes in industry literature). These can identify in some cases what the bottle or jar looked like – even if only a fairly small fragment is available.

Of greatest importance, the American Bottle Co. began using date codes on some of its bottles in 1906. A few breweries and soda bottlers had included four-digit date codes on their bottles during the last half of the 19th century, but these were scarce. Once the American Bottle Co. began using first one-digit then two-digit date codes, it began a trend that others quickly emulated. By 1930, most soda and milk bottles included date codes. In 1934, federal law mandated date codes on all bottles made to contain liquor. We have included a discussion of date (and other) codes whenever applicable. We hope that our format and information will provide a useful tool for dating and bottle identification.

Volume W-X-Y-Z

The Bottle Research Group

(In order by membership date)

Bill Lockhart, Bill Lindsey, Carol Serr
Pete Schulz, Beau Schriever, & Bob Brown

With Contributions by

Tod von Mechow, David Whitten, and Al Morin

Table of Contents

Volume T-U-V

Preface.	iii
Table of Contents.	ix

Logos and Glass Houses - T-U-V

Warren & Whiteman Firms.	1
Histories.	1
Walton's Druggists' Glass Works.	1
Walton Patents.	3
September 23, 1862.	3
May 28, 1867.	4
May 28, 1867.	4
Containers and Marks.	5
Walton Jars.	5
W.N. WALTON.	5
Warren Glass Works.	6
Patents, Containers, and Marks.	7
Warren Glass Works.	7
Louis N. Whiteman Patents.	9
April 28, 1878.	10
March 23, 1880.	11
April 3, 1883.	12
September 7, 1883.	13
September 23, 1884.	13
June 16, 1885.	15
April 17, 1888.	16
February 18, 1890.	17
October 25, 1892.	18
December 18, 1900.	19
Containers and Marks.	20

WARREN GLASS WORKS.	20
WARREN GLASS WORKS Co.....	21
Warren Glass Works Co..	23
Containers and Marks.	24
WARREN GLASS WORKS.	24
A.V. Whiteman.	24
Containers and Marks.	25
WHITEMAN.	26
WHITEMAN.	27
POWELL & LOCKWOOD.	28
Discussion and Conclusions.	29
Acknowledgments.	31
Sources.....	31
WEBER.	39
History.	39
O.J. Weber Co.....	39
Containers and Marks.	40
WEBER.	40
Discussion and Conclusions.	42
Acknowledgments.	43
Sources.....	43
Weeks & Gilson and the Southwest Stoddard Glass Co..	45
History.	45
South Stoddard Glass Works.	45
Containers and Marks.	46
W.	46
WEEKS AND GILSON.....	46
WEEKS GLASS WORKS.....	47
Discussion and Conclusions.	47
Acknowledgments.	47
Sources.....	47

West Coast Glass Co.	49
History.	49
West Coast Glass Co.....	49
Containers and Marks.	51
WCGCO.....	51
W-in-C Monogram.....	52
Discussion and Conclusions.	52
Acknowledgments.	52
Sources.....	52
Western Bottle Manufacturing Co.	55
History.	55
Western Bottling Manufacturing Co.....	55
Containers and Marks.	56
BREED.	56
GEM OVAL.....	57
Justrite.	57
WB monogram.....	57
W.B.M.CO..	58
W.B. / M.CO.....	59
WESTERN BOTTLE / MFG. CO.....	59
Discussion and Conclusions.	60
Acknowledgments.	61
Sources.....	61
Western Glass Mfg. Co.	65
Histories.....	65
Denver Art & Plate Glass Co..	65
Denver Flint Glass Co.....	65
Valverde Glass Works.	65
Containers and Marks.	66
GOOD, R. GOOD, JR. and PETTICOAT.....	66
Western Flint Glass Co.....	67

Containers and Marks.	68
W.F.G.CO..	68
20 (probably other numbers) on Base.	68
Western Glass Mfg. Co..	68
Containers and Marks.	69
“Buckle”	70
10, 20, 30, 40, 50, or 100 (plus 5 or 15)..	71
15 on Base.	75
Other Numbers on Colorado and Utah Bottles.	75
Discussion and Conclusions.	77
Acknowledgments.	77
Sources.. . . .	77
Whitall Tatum – Part I – Whitall Tatum & Co..	81
Histories.. . . .	81
James Lee.. . . .	82
Edward Carpenter.	82
Gideon Scull.. . . .	82
Nathaniel Soloman.. . . .	83
Burgin & Wood.	83
Burgin, Wood & Pearsall.. . . .	84
Burgin & Pearsall.. . . .	85
Scattergood, Booth & Co..	85
Scattergood, Haverstick & Co..	85
Scattergood & Whitall.	85
Whitall & Brother.	86
Whitall, Brother & Co..	86
Whitall, Tatum & Co..	87
Plates on Pharmacy Bottles.	88
Laboratory Glass.	90
Containers and Marks – Pharmacy Bottles.	91
An Important Note About Sources..	95
W.T.&Co..	96

(letter or number) / W.T.&Co.....	97
W.T.&Co. / (letter or number).....	97
W.T.&Co. / (letter) U.S.A.....	98
W.T.&Co. / U.S.A.....	98
W.T.&Co. / (letter or number) / U.S.A.....	99
(letter) / W.T.Co. / U.S.A..	100
W.T.&Co. / U.S.A. / (letter).....	100
* * * / W.T.&Co. / U.S.A. / (letter).....	100
W.T.&Co. / * * * / U.S.A. / (letter).....	101
* * * / (letter or number).....	101
* * * / W.T.&Co. / (letter) U.S.A..	102
Logos with stars on one or both sides.....	102
Design Patents.....	103
Other Markings, Colors, and Other Container Types.....	103
WT&Co monogram.....	104
Laboratory Ware and Other Goods.....	105
Other Druggists' Ware.....	106
MANHATTAN OVAL.....	107
W.T.&Co. / (single or double letter) / U.S.A..	108
Food and Milk Bottles.....	108
Fruit Jars.....	100
MILLVILLE.....	111
MILLVILLE FRUIT JAR, Domed Lid.....	111
MILLVILLE FRUIT JAR, Hollow Stopper.....	112
MILLVILLE ATMOSPHERIC FRUIT JAR.....	113
Variation 1.....	114
Variation 2.....	115
Half-Pint Jar.....	116
Variation 3.....	117
MILLVILLE IMPROVED.....	118
HOUSEHOLD W.T.&CO. FRUIT JAR.....	120
Museum Jars.....	121
Other Whitall Tatum Jars.....	123

W.T.&Co. / (number).....	123
W.T.&Co. / (3- or 4-digit number) / (number).	123
W.T.&Co. / (3- or 4-digit number) / (number) U.S.A..	126
H.B.CO. (and other) Cobalt Blue Poison Bottles.	127
Possible User.	129
Harrison Brothers & Co..	130
Discussion and Conclusions.	130
Acknowledgments.	130
Sources.....	131
Whitall Tatum – Part II – Whitall Tatum Co.	139
History.	139
Whitall Tatum Co.....	139
Containers and Marks – Pharmacy Bottles.	142
W.T.C..	142
W.T.Co. / U.S.A..	143
W.T.Co. / (letter or number) / U.S.A..	143
* * * /W.T.Co. / (letter or number) / U.S.A..	144
W.T.Co. / (letter or number).	144
(letter) / W.T.Co..	144
W.T.Co. / (letter) / MILLVILLE.	145
(letter) / U.S.A...	145
A Note on the End Date.....	145
Design Patents.	145
Other Markings, Colors, and Other Container Types.	146
WTCO Monogram.	147
Laboratory Ware and Other Goods.	149
Other Druggists’ Ware.....	150
W.T.Co. / (double letter) / U.S.A..	150
Acid Bottles and Recessed Ware.....	151
Food, Beer, and Milk Bottles.....	152
Museum Jars.	154
Other Whitall Tatum Jars.....	155

W.T.Co. / (number) / (letter).	156
Whitall Tatum Insulators.	156
Later Whitall Tatum Marks.	157
W / T in an inverted triangel.	157
Liquor Ware.	160
Discussion and Conclusions.	160
Acknowledgments.	161
Sources.	162
Whitney Glass Works.	167
Histories.	167
Olive Glass Works.	167
Harmony Glass Works.	168
Temperenceville Glass Works.	169
Whitney, Smith & Co..	169
Whitney Brothers.	169
Whitney Glass Works.	171
Patents.	174
Samuel Whitney.	174
1861 – Glass Stopper.	174
1897 – Bottle Design.	174
John Focer.	174
1866 – Fruit Jar Closure.	174
1869 – Reissue of the 1866 Patent.	175
William Hauck.	175
1876 – Improvement in Pontees for Holding Bottles.	175
Containers and Marks.	175
Fruit Jars.	177
BANNER.	177
GLASSBORO.	177
JERSEY.	179
THE TELEPHONE JAR.	180
WB monogram and LEADER.	181

THE WHITNEY MASON PORCELAIN LINED.	182
THE WHITNEY MASON.	182
WHITNEY MASON.	183
ATLAS WHITNEY MASON.	184
Ghosted Whitney Mason.	185
WHITNEY GLASS WORKS.	185
The Mason Jar of 1872.	185
MASON'S IMPROVED with CFJCo monogram.	187
MASON'S IMPROVED on Ghosted GLASSBORO.	187
WHITNEY.	188
Ghosted WHITNEY.	189
Milk Bottles.	191
Flasks and Liquor Bottles.	192
WHITNEY GLASS WORKS.	192
Other Containers.	192
W.	192
WB-ligature.	193
[zigzag] W.	194
[zigzag] WG.	194
W.G. / U.D.Co.	194
W in a diamond.	195
Tokens.	195
Discussion and Conclusions.	195
Acknowledgments.	196
Sources.	197
The Thomas Wightman Glass Companies.	203
History.	203
1. The Pittsburgh Years.	203
Thomas Wightman & Co..	204
Thomas Wightman & Co., Ltd..	205
Pittsburgh.	205
Parker (formerly Parker's Landing).	205

2. The Expansion Period.	206
Thomas Wightman Glass Co..	206
Parker, Pennsylvania.	207
Monongahela, Pennsylvania.	207
Morgantown, West Virginia.	207
3. The Post Thomas Wightman Perios.	208
Wightman Glass Co., Parker.	208
S.R. Wightman Glass Co., Morgantown.	209
Wightman Glass Co., Punxsutawney.	209
4. The Breakup Period.	209
Wightman Bottle & Glass Co., Parker.	210
Wightman Glass Corp., Punxsutawney.	210
Wightman Co-operative Glass Co., Port Allegany.	210
Containers and Marks.	212
W (cursive)..	212
W (block)..	213
W&Co.	213
TW&Co.	215
TW&Co monogram.	217
WGCo.	217
Beer Bottles.	217
Other WGCo Bottles and Jars.	218
WGCo monogram.	219
Discussion and Conclusions.	219
Acknowledgments.	220
Sources.	220
William Frank & Sons.	227
Histories.	227
William Frank & Co..	227
William Frank.	228
William Frank & Sons.	228
Containers and Marks.	229

William Frank.	230
W.F.&Co...	230
W.F..	230
M ^M Frank.	231
WILLIAM FRANK.	232
William Frank & Sons.	232
F.	233
WF&S.	233
W.F.&SONS.	233
W. FRANK & SONS.	234
W ^M FRANK & SONS.	236
W ^M FRANK & SONS.	236
W ^M FRANK & SONS PITT.	236
W ^M FRANK & SONS PITTS.. . . .	237
W ^M FRANK & SONS PA.	238
H FRANK.. . . .	238
Discussion and Conclusions.	240
Acknowledgments.	241
Sources.	241
William Franzen & Son.	247
History.	247
William Franzen & Son.	247
Container and Marks.	251
Manufacturing Methods.. . . .	251
Finishes.	252
Configurations.	253
1. Horizontal on base – WF&S {letter}.. . . .	253
2. Arched on base – WF&S / MIL with central design.	254
3. Arched on base – WF&S / MIL with number or letter.	255
4. Arched on base – WF&S / WIS with number or letter.	256
5. Horizontal on base – WF&S / MIL with number.. . . .	256
6. Horizontal on heel – WF&S with number.	256

Discussion and Conclusion.	257
Acknowledgments.	259
Sources.	259
William McCully & Co.	263
History.	263
Hay & McCully.	264
William McCully.	264
William McCully & Co..	264
William McCully & Co..	265
Consoliation?.	266
McCully Factories.	267
Union Glass Works.	267
Phoenix Glass Works.	267
Williamsport Glass Works.	268
Unknown Name.	268
Sligo Glass Works.	269
Pittsburgh Glass Works.	269
Unknown.	269
Pittsburgh Glass Works.	269
Empire Glass Works.	270
Mastodon Glass Works.	270
Containers and Marks.	270
More Complex Logos.	273
1. W ^M M ^C CULLY&C ^o or W ^M M ^C C&Co.	273
W ^M . M ^c CULLY & Co / PITTSBURGH P ^A	273
WM. M ^c CULLY & Co / PITTS__ (or PITTSBURGH).	274
W ^M M ^C CULLY&Co.	275
W ^M M ^C C&Co PITTS P ^A	276
W ^M M ^C C&Co.	276
2. W M ^c CULLY & Co..	277
W. M ^c CULLY&CO / GLASS WORKS / PITTSBURGH.	278
W. M ^c CULLY & Co. PITTSBURGH PA.	278

W M ^c CULLY & Co. PITTS P ^A	280
W. McCULLY & CO. PITTS.	280
W McCULLY&Co..	280
3. W.M ^c C&Co...	281
W.M ^c C&Co.PITTS (or PITTS P ^A).	281
W.M ^c C&Co...	283
Less Complex Logos.	286
1. W.M ^c C.	286
2. M ^c C&Co..	286
Mistakes or MisStrikes.	287
McC&Co...	288
Mc.&Co..	288
MCCo..	288
M ^e E &C ^o	288
3. M ^c C or M ^c C..	289
The Error – McG.	291
McCully & Co. or McCully.	291
Hostetter’s Stomach Bitters.	292
McCully and the Development of the Export Beer Bottle.. . . .	292
Discussion and Conclusions.	293
Acknowledgments.	295
Sources..	295
Winslow Glass Co..	301
History.	301
Winslow Glass Co...	301
Winslow Glass Co...	303
Containers and Marks.	307
W.	307
5W.	308
5 / W..	309
W in the Massachusetts Seal.	309
5 / in the Maine Seal.	309

5 in the Minnesota Triangle.....	310
W in Conjunction with Berney-Bond Logos.	311
DE LAVAL.	311
Discussion and Conclusions.	311
Acknowledgments.	312
Sources.....	312
Wisconsin Glass Co.....	317
History.	317
Wisconsin Glass Co..	317
Containers and Marks.	319
Plant No. 1.	320
Plant No. 2.	320
Discussion and Conclusions.	323
Classifying the Marks.	323
Conclusion.	324
Acknowledgments.	325
Sources.....	325
Woodbury Glass Houses.	327
Histories.....	327
Woodbury Glass Works.....	327
Woodbury Bottle Works.	330
Patents.	331
Thomas G. and John H. Otterson, 1884.....	331
Thomas G. Otterson and Cornelius C. Voorhees, 1885.....	332
Thomas G. and John H. Otterson, 1886.....	332
Thomas G. Otterson and Cornelius C. Voorhees, 1886.....	333
Henry M. Guild, 1886.	333
P. Kennedy Reeves, 1886.....	333
Thomas G. Otterson, 1888.....	334
Containers and Marks.	335
WGW.....	335

Fruit Jars.....	335
ADVANCE.....	336
HAMILTON.....	336
WOODBURY.....	337
WOODBURY.....	337
WOODBURY WGW Monogram.....	338
WOODBURY IMPROVED.....	339
WOODBURY STERILIZER.....	342
Woodbury Glass Co.....	344
Woodbury Glass Co.....	344
Woodbury Glass Co.....	344
Containers and Marks.....	346
W.G.CO.....	346
Discussion and Conclusions.....	347
Acknowledgments.....	348
Sources.....	348
Wormser Glass Companies.....	353
Histories.....	353
Wormser, Burgraff & Co.....	353
E. Wormser & Co.....	354
E.Wormser & Co., Ltd.....	354
Wormser Glass Co.....	355
Wormser Co.....	356
Containers and Marks.....	357
E. WORMSER & Co.....	357
E.W.&Co.....	357
E.W.CO. WORKS.....	358
W.G.CO.....	358
Discussion and Conclusions.....	359
Sources.....	359

W.G.Co. Marks.	363
Containers and Marks.	363
W.G.Co.....	363
Beer Bottles.	364
Soda Bottles.....	365
Prescription Bottles.	366
Milk Bottles.....	366
Fruit Jars.....	367
Glass House Histories.	367
Wagner Glass Co..	368
Warwick Glass Co..	368
Thomas Wightman Glass Co..	369
Williamstown Glass Co..	369
Woodbury Glass Co..	369
Wormser Glass Co..	370
Discussion and Conclusions.	370
Acknowledgments.	374
Sources.....	374
Other W Marks.	377
Containers and Marks.	377
W.	377
W with zigzag.	377
WATERFORD.....	378
Possible Manufacturers.	379
Brownsville Glass Works.....	379
Waterford Glass Works.	380
W.B., WB monogram, and WITTEMAN BROS..	380
User.	381
Witteman Bros..	381
W.C.	381
WCD.	382
Manufacturer.	383

Star Glass Works.	383
W.C. DePauw Glass Co..	383
WCGCo.	384
Possible Manufacturer.	385
Wightman Co-Operative Glass Co..	385
W.C.&G.	385
WESTFORD GLASS Co..	385
Manufacturer.	386
Westford Glass Co..	386
WG.	387
WBGC ^o	388
Manufacturer.	388
Wear Glass Works.	388
Wear Flint Glass Co..	389
Wear Glass Bottle Co..	389
WGCo Monogram.	389
WG&Co.	390
WG&S LTD.	390
WHEAT PRICE & CO..	390
Manufacturer.	391
Wheat, Price & Co..	391
WHEELER FRUIT JAR.	391
Manufacturer.	392
Campbell Glass Works.	392
WHEELING GLASS WORKS.	393
Manufacturer.	393
Wheeling Glass Works..	393
WICKSON.	393
WILLIAMSTOWN.	393
WILLINGTON GLASS WORKS or WILLINGTON GLASS Co..	394
Manufacturer.	395
Willington Glass Works.	395
WI&P.	395

Manufacturer.	396
Whitehead, Ihmsen & Phillips.	396
W.L.	396
WNGCo.	397
WOOSTER.	397
Manufacturer.	397
Wooster Glass Co..	397
W.P.G.Co..	398
Manufacturer.	399
West Penn Glass Co..	399
WRW&Co...	399
W.S.M.G.Co. or W.S.M.C.Co..	400
W&T.	401
W.W.VA.S.F.&Co..	401
Discussion & Conclusions.	402
Acknowledgments.	402
Sources.	402
X Marks.	409
Containers and Marks.	409
General Marks.	409
Soda Bottles.	411
Discussion and Conclusions.	412
Acknowledgments.	413
Sources.	413
York Glass Co. and the YGCo Logo.	415
History.	415
York Glass Co...	415
Containers and Marks.	415
Acknowledgments.	416
Sources.	416

Z Logos.	419
Factories and Jobbers – WXYZ.	421
Manufacturer’s Marks and Other Logos on Glass Containers – WXYZ.	425
Complete Factory List.	433